

19786

~~SECRET~~



**IA HISTORICAL REVIEW PROGRAM
RELEASE AS SANITIZED
1999**

CIA/RR ER SC 66-8

9 SEPTEMBER 1966

COPY No.

INTELLIGENCE REPORT

SHIPPING TO NORTH VIETNAM DURING 1965

DIRECTORATE OF INTELLIGENCE

~~SECRET~~

~~GROUP
EXCLUDED FROM AUTOMATIC DOWNGRADING
AND DECLASSIFICATION~~

CONTENTS

	<i>Page</i>
Summary	1
I. Free World and Communist Shipping	5
A. Basic Comparison, 1964 and 1965	5
B. Free World Shipping	5
C. Communist Shipping	6
D. Changes During 1965	8
II. Volume and Direction	13
A. Seaborne Imports	13
B. Seaborne Exports	15
C. Cargoes Handled by North Vietnamese International Maritime Ports	18

APPENDIXES

	<i>Page</i>
Appendix A. International Operations by North Vietnamese Merchant Ships, 1965	23
Appendix B. Statistical Tables	25

TABLES

	<i>Page</i>
1. Foreign Ship Arrivals at North Vietnam, by Number and Gross Tonnage, 1964 and 1965	5
2. Selected Free World Ship Arrivals at North Vietnam, 1964 and 1965	6
3. Identified Trade with North Vietnam Carried on Free World Ships, 1964 and 1965	6
4. Identified Trade with North Vietnam Carried on Soviet and Eastern European-Flag Ships, 1964 and 1965	8

~~SECRET~~

	<i>Page</i>
5. Foreign Ship Arrivals at North Vietnam, by Quarter, 1965	9
6. Gross Tonnage of Foreign Ship Arrivals at North Vietnam, by Quarter, 1965	9
7. Identified Trade with North Vietnam Carried on Foreign Ships, by Quarter, 1965	10
8. Identified Imports to North Vietnam Carried on Foreign Ships, by Origin, 1964 and 1965	14
9. Imports to North Vietnam Carried on Foreign Ships, Identified in Terms of Volume Only, 1965	15
10. Exports of Coal from North Vietnam and the Share Carried on Free World Ships, 1965	16
11. Average Monthly Volume of Foreign Ship Cargoes Handled by Haiphong, 1964, 1965, and Quarterly 1965	21
12. Average Monthly Volume of Coal Shipments from North Vietnam Carried on Foreign Ships, 1964 and 1965	21
13. North Vietnamese Ships of over 600 Gross Register Tons Engaged in International Trade, as of 31 December 1965	23
14. Distribution of Voyages, Gross Tonnage, and Identified Trade of North Vietnamese Ships, by Destination, 1965	24
15. Identified Trade of North Vietnamese Ships, by Commodity, 1965	24
16. Foreign Ship Arrivals at North Vietnam, 1964 and 1965	25
17. Identified Imports to North Vietnam Carried on Foreign Ships, by Commodity and Origin, 1964 and 1965	26
18. Identified Exports from North Vietnam Carried on Foreign Ships, by Commodity and Destination, 1964 and 1965	26
19. Arrivals at North Vietnam of Free World Ships Under Charter to Communist Countries, 1964 and 1965	27
20.	27
21. Identified Imports to North Vietnam Carried on Foreign Ships, by Commodity, Carrier, and Origin, 1965	28
22. Identified Exports from North Vietnam Carried on Foreign Ships, by Commodity, Carrier, and Destination, 1965	29
23. Foreign Ship Arrivals at North Vietnam, 1964, 1965, and Monthly 1965	30
24. Identified Trade with North Vietnam Carried on Foreign Ships, 1964 and 1965	31

~~SECRET~~

ILLUSTRATIONS

	<i>Page</i>
Figure 1. Foreign Ship Arrivals at North Vietnam, 1964 and 1965 (Chart)	2
Figure 2. Identified Trade with North Vietnam Carried on Foreign Ships, 1964 and 1965 (Chart)	2
Figure 3. Identified Imports and Exports for North Vietnam Carried on Foreign Ships, 1965 (Chart)	13
Figure 4. Cargo-Handling Operations at Haiphong (Photographs)	19
Figure 5. North Vietnam's Coal Ports, Hon Gay and Cam Pha (Photographs)	20

~~SECRET~~

~~SECRET~~

SHIPPING TO NORTH VIETNAM IN 1965*

Summary

A substantial decrease in Free World shipping to North Vietnam in 1965 was almost offset by a sharp increase in Soviet and Chinese Communist shipping. Port calls by all foreign ships decreased 9 percent from the 1964 level, but cargoes aboard these ships increased at least 9 percent. (See Figures 1 and 2.) Significant increases occurred in seaborne imports of POL, fertilizer, and general cargoes from Communist countries and in exports of coal and general cargoes to Communist countries. Exports of cement decreased substantially, and exports of apatite ceased in August 1965 as a result of US bombings.

In comparison with 1964 the number of calls at North Vietnam by Free World ships declined 36 percent in 1965, but the volume of cargo carried by these ships declined only 7 percent. Calls by ships of Communist countries, however, increased 54 percent and the volume of their cargoes at least 56 percent. Calls by Chinese Communist ships doubled.

There were substantial changes in the volume of seaborne trade in the course of 1965. A withdrawal of Free World ships began soon after the initiation of the bombings in February 1965, but a compensating increase in Communist shipping did not materialize until the fall of the year. Consequently, there was a rapid decline in total ship arrivals and volume of cargo during the second and third quarters of the year, followed by a partial recovery in the fourth quarter. Some of these changes are attributable to the direct or indirect effects of the bombings.

No seaborne shipments of arms or ammunition were detected, although cargoes aboard a number of Communist ships included vehicles and equipment suitable for military support roles as well as civilian use.

* This report was produced by CIA. Aside from the normal substantive exchange with other agencies at the working level, this report has not been coordinated outside CIA. It was prepared by the Office of Research and Reports; the estimates and conclusions represent the best judgment of the Directorate of Intelligence as of August 1966.

~~SECRET~~

~~SECRET~~

Figure 1
FOREIGN SHIP ARRIVALS AT NORTH VIETNAM
1964 AND 1965

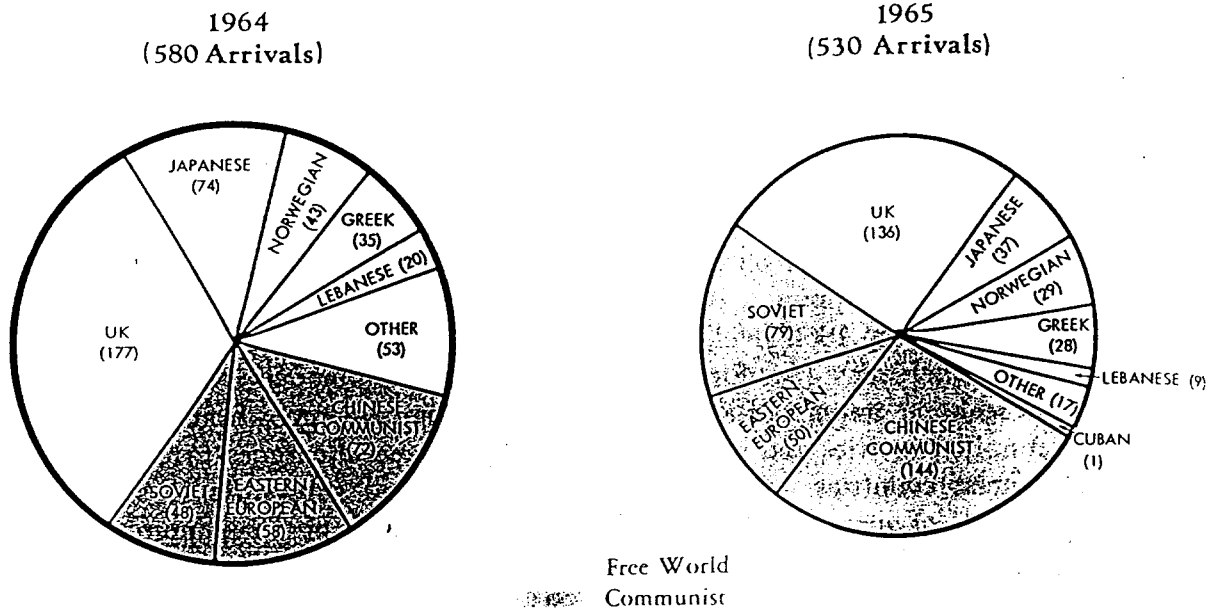
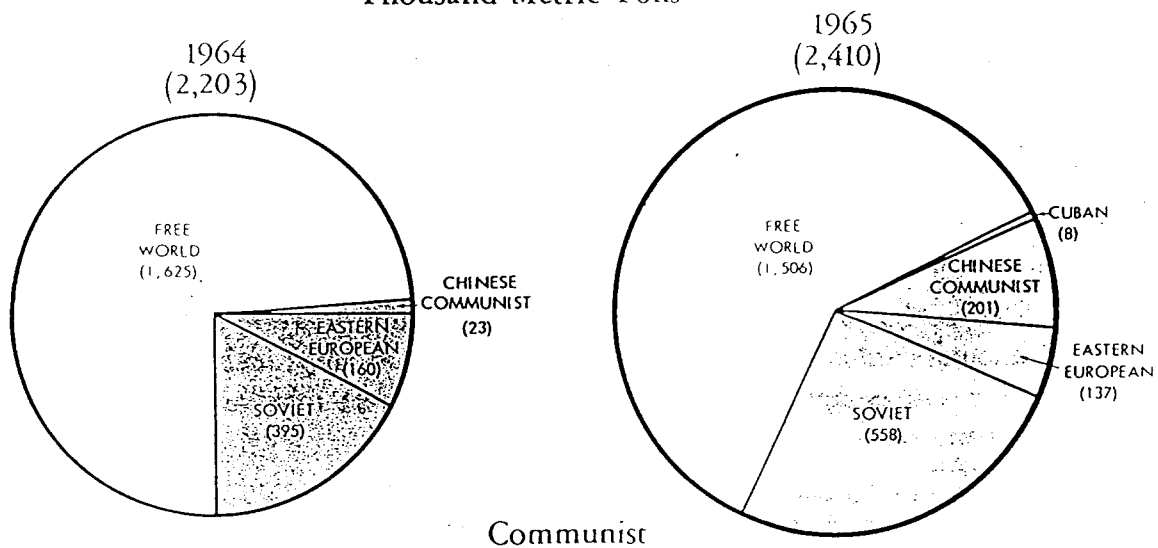


Figure 2

IDENTIFIED TRADE WITH NORTH VIETNAM CARRIED ON FOREIGN SHIPS
1964 AND 1965

Thousand Metric Tons



~~SECRET~~

~~SECRET~~

More than half of North Vietnam's international seaborne trade in 1965, including almost all seaborne imports, was handled at the port of Haiphong. The only other ports in the international trade—Cam Pha and Hon Gay—handled only one significant item—exports of anthracite, more than 90 percent of which was shipped from Cam Pha.

In addition to foreign merchant shipping, five North Vietnamese ships of over 600 gross register tons (GRT) each were engaged in international trade at the end of 1965. These ships carried cargoes equal to 2 percent of the identified cargoes carried to and from North Vietnam by foreign-flag ships. Ninety-one percent of the cargoes identified on the five ships were exports, and 96 percent of these exports went to Hong Kong. Cement was the principal export on North Vietnamese ships.

~~SECRET~~

BLANK PAGE

~~SECRET~~

I. Free World and Communist Shipping

A. BASIC COMPARISON, 1964 AND 1965

Foreign merchant ships made 530 calls at North Vietnam in 1965, 9 percent fewer than in 1964.* A substantial decline in arrivals of Free World ships was in large part balanced by an increase in arrivals of Communist ships. The gross tonnage of arriving ships increased by 1 percent (see Table 1).

B. FREE WORLD SHIPPING

The 256 Free World ships that called at North Vietnam in 1965 were from 12 Free World countries. In 1964, there were 402 calls by ships of 15 Free World countries.** Ships of only five countries accounted for about 90 percent of the calls by Free World ships in both years, as shown in Table 2.

Despite the 36 percent decrease in the number of calls by Free World ships in 1965 compared with 1964, the tonnage of identified cargoes on Free World ships declined by less than 8 percent. In

* Foreign merchant ships carry nearly all of North Vietnam's international maritime trade. In 1965 the volume of cargoes identified aboard North Vietnamese merchant ships on international voyages amounted to less than 2 percent of the volume identified on foreign ships. For a brief description of the North Vietnamese merchant fleet and its international operations in 1965, see Appendix A.

** A breakdown of foreign flag ship arrivals at North Vietnam in 1964 and 1965 is given in Table 16, Appendix B. A breakdown of these arrivals by month for 1965 is given in Table 23, Appendix B.

Table 1

Foreign Ship Arrivals at North Vietnam, by Number and Gross Tonnage
1964 and 1965

Flag	Arrivals			Gross Tonnage		
	1964	1965	Change (Percent)	1964 (Thousand Gross Register Tons)	1965 (Thousand Gross Register Tons)	Change (Percent)
Total	580	530	-9	2,655	2,671	+1
Free World	402	256	-36	1,646	1,250	-24
Communist	178	274	+54	1,008	1,421	+41
Soviet	48	79	+65	359	529	+47
Eastern European	58	50	-14	419	345	-18
Chinese Communist	72	144	+100	230	537	+133

* This total includes a Cuban ship that is not included in subtotals.

~~SECRET~~

~~SECRET~~

Table 2

Selected Free World Ship Arrivals at North Vietnam
1964 and 1965

Flag	1964		1965	
	Arrivals	Percent	Arrivals	Percent
Total	402	100	256	100
<i>Ships of selected Free World flags</i>	<i>349</i>	<i>87</i>	<i>239</i>	<i>93</i>
British.....	177	44	136	53
Japanese.....	74	18	37	14
Norwegian.....	43	11	29	11
Greek.....	35	9	28	11
Lebanese.....	20	5	9	4

1965, Free World ships carried nearly 63 percent of all identified cargoes of foreign ships, but a much larger percentage were exports than imports. In terms of volume, the identified export cargoes carried by Free World ships were about five times their inbound cargoes, as shown in Table 3.

Fifty-five percent of the Free World ships that visited North Vietnam in 1965 were under charter to Communist countries, particularly Communist China and North Vietnam (see Table 19, Appendix B). Reflecting their employment by Communist countries, 56 percent of the export cargoes carried by these ships were discharged at ports of Communist countries, and 57 percent of the import cargoes originated in Communist countries. No Free World ships are known to have carried arms or ammunition to North Vietnam.

C. COMMUNIST SHIPPING

The 274 calls by Communist ships at North Vietnam represented a 54 percent increase over the 1964 level and included substantial in-

Table 3

Identified Trade with North Vietnam Carried on Free World Ships
1964 and 1965

Cargo and Flag	1964		1965	
	Thousand metric tons	Percent	Thousand metric tons	Percent
Total seaborne cargoes	2,202.9	100	2,410.2	100
Free World flag.....	1,624.9	73.8	1,506.4	62.5
<i>Imports</i>	<i>638.0</i>	<i>100</i>	<i>697.1</i>	<i>100</i>
Free World flag.....	287.0	45.0	248.4	35.6
<i>Exports</i>	<i>1,564.9</i>	<i>100</i>	<i>1,713.1</i>	<i>100</i>
Free World flag.....	1,337.9	85.5	1,258.0	73.4

~~SECRET~~

~~SECRET~~

creases in calls by both Soviet and Chinese Communist ships. Cargoes carried increased 56 percent. The greater increases in cargo volume undoubtedly were made by the Chinese Communist ships, but no precise comparison can be made with 1964, because information for both years is fragmentary and only the 1965 totals include estimates of coal cargoes carried from North Vietnam to China by Chinese Communist ships. The actual increase in cargoes carried by Chinese Communist ships probably was comparable to the 133 percent increase in the aggregate tonnage of Chinese ships sailing to North Vietnam in 1965. If so, Chinese ships carried more cargo to and from North Vietnam than did Soviet ships. Although the aggregate tonnage of Chinese Communist ships was only 2 percent greater than that of the Soviet ships in 1965, the rate of utilization of the Chinese ships was substantially higher. Many of the Soviet ships delivered cargo to other points en route to North Vietnam, and relatively few carried cargoes both inbound and outbound. Chinese ships, on the other hand, sailed almost exclusively between North Vietnamese and Chinese ports (principally Huang-pu and Fort Bayard), frequently carrying cargoes in both directions, and being fully loaded on at least one leg of the voyage.

Apparently to improve the management of her increased seaborne trade with North Vietnam, Communist China established shipping offices in Haiphong and Cam Pha late in the summer of 1965. The Chinese organizations to which these offices are subordinate manage Chinese ships engaged in international trade and also act as agents for foreign ships. They are not known to have established any other offices outside of Communist China.

Ships jointly owned by China and three Eastern European countries accounted for 21 of the 50 calls at North Vietnam by ships under Eastern European flags in 1965. These included 16 of the 40 calls by Polish-flag ships, all 4 calls by Czechoslovak-flag ships, and the single visit by an Albanian-flag ship. Crews of several of these ships were predominantly Chinese. The jointly owned ships were engaged primarily in transporting goods in the Sino-European trade, and usually called at North Vietnam only while en route to Europe with Chinese export cargoes.

Ships in cargo liner service for the Polish Ocean Lines (PLO) made all 19 calls in 1965 by Eastern European ships not jointly owned with Communist China. PLO liners provided connections with the principal ports of Northern Europe, the Middle East, and Southeast Asia. These liners carried principally low-volume general cargoes of rela-

~~SECRET~~

~~SECRET~~

tively high unit value. As of the end of 1965, PLO was the only shipping company still providing scheduled cargo liner services to North Vietnam.

Cargoes aboard Eastern European ships declined in the same proportion as the decline in the number of calls they made at North Vietnam between 1964 and 1965—14 percent. Soviet ships, on the other hand, carried 41 percent more cargoes to and from North Vietnam in 1965 than in 1964, the larger gains being made in shipments from the USSR to North Vietnam. These changes are summarized in Table 4.

Of the 79 calls at North Vietnam by Soviet ships in 1965, 50 were made by ships sailing from Soviet ports. All 14 tankers and 30 dry cargo ships sailed from Soviet Black Sea ports, and another 6 calls were made by Soviet ships carrying fertilizer from the Soviet Far Eastern port, Nakhodka.

The remaining 29 calls were by Soviet ships sailing between North Vietnam and non-Soviet Far Eastern ports. Twenty-six of these calls were by Soviet ships under charter to North Vietnam; the ships carried away coal, cement, and pig iron from North Vietnam and returned with fertilizer, rice, timber, and general cargoes. Three calls were by Soviet ships, which arrived in ballast to load coal for Japan. These ships may have been under voyage charters to Vietfracht (the North Vietnamese ship chartering organization).

D. CHANGES DURING 1965

Significant changes in foreign shipping to North Vietnam followed the intensification of US airstrikes on North Vietnam in March 1965. Calls by all foreign ships were 29 percent fewer in the last quarter than during the first quarter, reflecting a 60 percent decline in calls by Free World ships and a 50 percent increase in calls by Chinese Communist ships, as shown in Table 5.

Table 4

Identified Trade with North Vietnam Carried on Soviet and Eastern European-Flag Ships
1964 and 1965

Flag	Imports			Exports		
	1964 (Thousand Metric Tons)	1965 (Thousand Metric Tons)	Change (Per- cent)	1964 (Thousand Metric Tons)	1965 (Thousand Metric Tons)	Change (Per- cent)
Soviet.....	266	385	+ 45	129	173	+ 34
Eastern European....	62	47	- 24	98	90	- 8

~~SECRET~~

~~SECRET~~

Table 5
Foreign Ship Arrivals at North Vietnam, by Quarter
1965

Flag	Quarter				Arrivals
	First	Second	Third	Fourth	
Total.....	170	130	109	121 ^a	
Free World.....	109	59	44	44	
Soviet.....	21	20	17	21	
Eastern European.....	12	15	10	13	
Chinese Communist.....	28	36	38	42	

^a This total includes a Cuban ship that is not included in the subtotals.

Table 6
Gross Tonnage of Foreign Ship Arrivals at North Vietnam, by Quarter^a
1965

Flag	Quarter				Thousand Register Gross Tons
	First	Second	Third	Fourth	
Total.....	710	705	576	681 ^b	
Free World.....	423	331	246	251	
Soviet.....	118	119	134	158	
Eastern European.....	79	108	68	91	
Chinese Communist.....	91	147	127	172	

^a Because of rounding, components may not add to the totals shown.

^b This total includes a Cuban ship that is not included in the subtotals.

As indicated in Table 6, the decrease in gross tonnage of foreign ship arrivals after the first quarter was less than the decrease in port calls because of increases in the average size of Soviet, Chinese Communist, and Free World ships.* Although Free World ship tonnage declined 41 percent, the tonnage of all foreign ships was only four percent less than that of the first quarter.

Similarly, the volume of cargoes identified aboard foreign ships in North Vietnamese ports decreased by only 4 percent between the first and fourth quarters of 1965, although cargoes identified on Free World ships declined by 27 percent over the same period. Because the decline in cargoes on Free World ships was less than the 40 percent decrease in tonnage, there appears to have been a better utilization of Free World ships in the fourth quarter. The change in identified cargoes during the year is shown in detail in Table 7.

* The average gross register tonnage of Soviet ships calling at North Vietnam increased from 5,600 CRT in the first quarter to 7,500 CRT in the last quarter, Chinese Communist ships from 3,200 CRT to 4,100 CRT, and Free World ships from 3,900 to 5,700 CRT.

~~SECRET~~

~~SECRET~~

Table 7

Identified Trade with North Vietnam Carried on Foreign Ships, by Quarter *
1965

Thousand Metric Tons

Flag	Quarter			
	First	Second	Third	Fourth
Total.....	655.3	695.1	527.6	632.2 ^b
Free World.....	455.0	368.9	350.4	332.0
Soviet.....	137.8	137.4	125.8	157.0
Eastern European.....	28.8	48.8	18.8	40.2
Chinese Communist.....	33.6	40.0	32.6	94.5

* Because of rounding, components may not add to totals shown.

^b This total includes cargo carried by a Cuban ship that is not included in the subtotals.

Most of the decline in calls by Free World ships followed quickly the intensification of airstrikes upon North Vietnam in March 1965. The most decisive reaction was the complete prohibition of further calls at North Vietnamese ports by Japanese ships effected on 1 April 1965 by mutual agreement between the All Japan Seamen's Union and the Japan Shipowners' Association. Although Japanese ships had accounted for 34 percent of calls by Free World ships at North Vietnam in the period January-March 1965, none called after March. Other spontaneous reactions included Lloyd's raising of insurance rates on ships and cargoes going to North Vietnam, outright refusals by some Free World crews to sail to North Vietnam, and widespread demands by crews that bonuses be paid for calls at North Vietnamese ports. Seamen's unions of several Free World countries subsequently succeeded in establishing standard bonus payments to crews of ships registered in their countries. Generally, these required double pay to crews for the time that their ships were in North Vietnamese waters, and stipulated payments to any crew members who were injured by hostile activities. Bonus payments to the crew of a Soviet ship under charter to Vietfracht also were reported.

Following US overtures, several countries took steps to curtail voyages to North Vietnam by their ships. By the end of the year, four of the five Free World countries whose ships called most frequently at North Vietnam had either taken prohibitive action or were in the process of doing so. In addition to the nongovernmental action that kept Japanese ships from sailing to North Vietnam after March, the Lebanese government rigorously implemented legislation passed in June which excluded Lebanese-flag ships from designated danger zones (including North Vietnam), and Norwegian authorities gave

~~SECRET~~

assurances that no Norwegian-flag ship would call at North Vietnam following the expiration in November of the Soviet charters of two Norwegian reefers carrying Vietnamese fruit to Soviet Far Eastern ports. Greek officials stated in December that restrictions covering Greek-flag ships were being drafted.

(. At least two of the Hong Kong companies whose ships have been prominent in the North Vietnam trade are alleged to be controlled by Communist China. Many other Hong Kong shipping companies trading with North Vietnam have been responsive to Communist Chinese interests because China is a principal customer. There are also indications that some powerful Hong Kong businessmen, acting in behalf of Communist China, have been able to influence the policies of companies not under direct Chinese Communist control.

Communist China's response to the withdrawal of Free World ships, which began in late April 1965, was prompt and effective. Several Free World ships under charter to China were subchartered to North Vietnam, and the widespread contacts of Sinofracht (Communist China's ship-chartering organization) were used to charter additional ships for the North Vietnam trade as required. Sinofracht also responded with bonuses to Free World ship crews that were reluctant to risk exposure to possible hostile action in North Vietnamese waters.*

Zealous Chinese Communist maritime support for North Vietnam apparently was the underlying reason for the sale to China of a

* An officer of a Soviet ship under charter to North Vietnam reported bonus payments in excess of those being paid to Free World crews, but it is not known whether this was a standard procedure. Polish maritime authorities, on the other hand, overcame their seamen's protests against voyages to North Vietnam with the ultimatum that they sail or resign from the merchant marine and forfeit all benefits.

~~SECRET~~

~~SECRET~~

jointly owned Czechoslovak-flag ship in early August of 1965. A crewman reported that a dispute developed between the co-owners over Chinese insistence that the ship not turn back if challenged by US naval forces while en route from China to Haiphong. The matter was resolved only by the transfer of the ship to the flag of Communist China, under which it sailed to North Vietnam. Within a few weeks two more Czechoslovak-flag ships and three ships of Chipolbrok (the Chinese-Polish Shipping Company) were sold outright to China. Most of these ships subsequently called at North Vietnam, and two of the ex-Czechoslovak-flag ships later delivered Chinese arms to Tanzania and Pakistan. No reports of operational policy differences on North Vietnam were linked to the five additional transfers, although it is odd that all three ex-Chipolbrok ships were put under time charters to that organization after being given Chinese names and placed under the Chinese flag.

~~SECRET~~

II. Volume and Direction

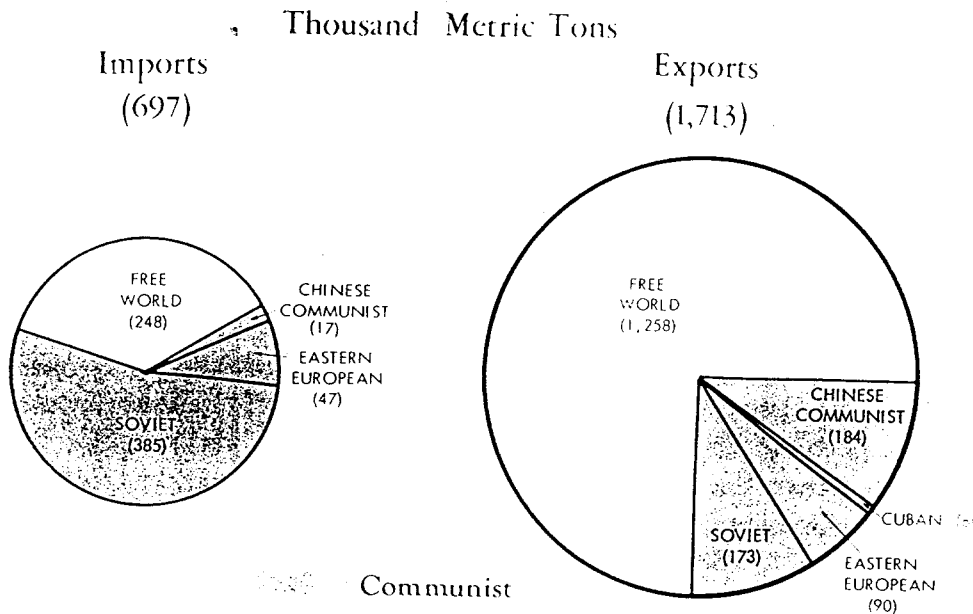
A. SEABORNE IMPORTS

Seaborne imports identified aboard foreign ships arriving at North Vietnamese ports in 1965 totaled 697,100 metric tons (see Figure 3, below, and Table 24, in Appendix B), an increase of more than 9 percent over 1964*: 65 percent of the total consisted of petroleum (all from Communist sources), fertilizers, and bulk foodstuffs. No deliveries of arms or ammunition were detected. Shipments from Communist countries increased to 79 percent of North Vietnam's seaborne imports, as shown in Table 8, and in greater detail in Tables 17 and 21, Appendix B.

Seaborne imports of petroleum increased to 170,200 tons. Free World ships carried 13,400 tons of POL from Communist China, and

* The actual increase in seaborne cargoes probably was much greater. Only fragmentary information is available for cargoes delivered to North Vietnam by Communist Chinese ships, which doubled their sailings to North Vietnam in 1965, compared with 1964. Unless otherwise indicated, tonnages are given in metric tons throughout this report.

Figure 3
IDENTIFIED IMPORTS AND EXPORTS FOR
NORTH VIETNAM CARRIED ON FOREIGN SHIPS
1965



~~SECRET~~

~~SECRET~~

~~SECRET~~

Table 8

Identified Imports to North Vietnam Carried on Foreign Ships, by Origin
1964 and 1965

Origin	1964		1965		Change in Volume (Percent)
	Thousand Metric Tons	Percent	Thousand Metric Tons	Percent	
<i>Total</i>	638	100	697	100	+9
Free World.....	175	27	148	21	-15
Communist Countries.....	463	73	549	79	+19

Eastern European countries shipped 2,000 tons on ships under Czechoslovak and Polish flags. The remainder was delivered by Soviet ships from the USSR. The rate of delivery of petroleum to Haiphong varied considerably over the course of the year, reaching a low point in the third quarter, as shown in the following tabulation (in thousand metric tons):

Quarter			
First	Second	Third	Fourth
34.2	55.3	14.1	66.5

Seaborne imports of bulk foodstuffs declined 27 percent to a total of 118,600 tons in 1965. Most of the decline was in deliveries from Free World countries, which supplied about half of the smaller 1965 volume compared with 63 percent the year before. However, 86 percent of all identified shipments of bulk foodstuffs in 1965 were carried by Free World ships. The volume of deliveries of bulk foods was quite steady through the first nine months of 1965, but it more than doubled in the last quarter, as shown in the following tabulation (in thousand metric tons):

Quarter			
First	Second	Third	Fourth
15.9	21.6	26.8	54.2

Imports of fertilizers amounted to 162,400 tons, an increase of 16 percent over the 1964 volume. Nearly 73 percent of identified seaborne shipments of fertilizer were supplied by Communist countries, particularly the USSR (78,500 tons) and North Korea (30,700 tons).

The volume of general and miscellaneous cargoes shipped to North Vietnam in 1965 amounted to 231,400 tons, 42 percent more than in

~~SECRET~~

Table 9

Imports to North Vietnam Carried on Foreign Ships Identified
in Terms of Volume Only
1965

Flag	Thousand Metric Tons	Percent
Total.....	79,000	100
Free World.....	8,100	10
Soviet.....	57,000	72
Eastern European.....	13,900	18

1964. Most of the increase was in deliveries from Communist countries, which provided 201,700 tons (87 percent) of these cargoes. The USSR was the principal supplier, with 114,900 tons. General and miscellaneous cargoes imported on foreign ships included 29,900 tons of coking coal, 6,800 tons of steel rails, 29,200 tons of other rolling mill products, 18,800 tons of machinery, 11,000 tons of gypsum, and about 2,000 trucks. Less than 12 percent of the identified seaborne imports were identified in terms of volume only (not by type of commodity). The distribution of these cargoes, by flag of carrier, is given in Table 9.

B. SEABORNE EXPORTS

Identified exports carried from North Vietnam by foreign merchant ships in 1965 totaled 1,713,000 tons, 9 percent more than in 1964 (see Tables 18 and 22, Appendix B).^{*} Decreases in exports of most major commodities were offset by an increase of 200,100 tons in identified coal shipments. Communist countries replaced Free World countries as the principal recipients of North Vietnamese cargoes. The volume of seaborne exports to Communist countries increased 55 percent over 1964, and shipments to Free World countries declined by 23 percent.

Seaborne exports of coal amounted to 1,150,100 tons, and accounted for 67 percent of the country's total volume of seaborne exports aboard foreign ships. Major importers of North Vietnamese coal were Communist China (495,100 tons), Japan (443,100 tons), Cuba (94,300 tons), and France (37,500 tons).^{**}

^{*} Actual seaborne exports may have increased somewhat less than 9 percent. Only the 1965 export figure includes estimates of coal shipments on Chinese ships that could not be similarly estimated for 1964. On the other hand, the fragmentary information on Chinese-ship cargoes in both years does not reflect a probable increase in other seaborne exports to China.

^{**} These data may differ from official foreign trade statistics of the countries involved.

~~SECRET~~

~~SECRET~~

Shipments of coal to France and other Western European countries declined sharply from 1964 levels, while identified shipments to Communist China more than doubled. This increase in identified sea-borne coal shipments to China apparently is attributable to increased exports in exchange for Chinese military and economic aid, to a diversion of rail shipments of coal to the sea route in the last quarter, and, to some extent, to better intelligence coverage. Shipments to Japan remained quite stable, increasing by only 22,100 tons over the 1964 level to 443,100 tons. Japanese importers, however, had contracted for 600,000 tons. Japanese sources attributed the shortfall to declining industrial demand and to shipping problems, which apparently involved only a shortage of the small (3,000-GRT) coal carriers provided by Japanese shipowners before they banned further calls at North Vietnam in March. Although larger (5,000- to 7,000-GRT) Free World and Soviet ships quickly replaced the Japanese ships in this trade, some small-volume Japanese importers apparently could not make economic use of their services. These small operators, however, normally account for only a small portion of Japan's coal imports.

There was no evidence that the withdrawal of many Free World ships from trade with North Vietnam had any significant effect upon the volume of seaborne coal exports. These increased throughout 1965 despite moderate decreases in volumes carried by Free World ships, as shown in Table 10.

Apatite shipments totaled 317,500 tons, only 6 percent less than the volume shipped in 1964, although none was shipped after early August, because of the interdiction in mid-July of the Lao Cai - Hanoi rail line over which the ore is moved to Haiphong for export. Average monthly loadings from January through July were 70 percent

Table 10

Exports of Coal from North Vietnam and the Share Carried on Free World Ships
1965

Flag	Quarter			
	First	Second	Third	Fourth
Thousand Metric Tons				
Total.....	241.0	278.5	280.5	350.0
Free World.....	231.5	206.8	220.7	222.8
Percent				
Percent of total carried by Free World ships.....	96	74	79	64

~~SECRET~~

~~SECRET~~

greater in volume than in 1964. Principal importers of North Vietnamese apatite were Eastern European countries, particularly Rumania, which was receiving the ore in exchange for technical assistance to the apatite mines at Lao Cai. Communist China and North Korea were the only non-European recipients of apatite. No apatite was shipped to Free World countries.

Identified seaborne shipments of cement amounted to only 78,400 tons in 1965, compared with 140,100 tons in 1964. The volume shipped to Cambodia, the principal customer in both years, was 36,300 tons, about the same as in 1964. Shipments to Malaya and Hong Kong were well below the 1964 volume.

The sharp drop in seaborne shipments of cement probably resulted from increased internal consumption or from an increase in shipments to China, to the detriment of Free World consumers, or for both of these reasons. There is no evidence that cement production was impaired by US airstrikes on North Vietnam. All raw materials except gypsum are available locally, and shipments of Chinese gypsum appear to have arrived regularly by both rail and sea throughout the year. The coincidence of the decline in seaborne exports of cement with the cumulative increase in bomb damage in North Vietnam points to the conclusion that exports may have been curtailed in the face of increasing internal requirements for cement for military construction and the repair of bomb-damaged structures.

The progressive decline in identified seaborne exports of cement from North Vietnam in 1965 is shown below (in thousand metric tons):

1964 Quarterly Average	Quarter, 1965			
	First	Second	Third	Fourth
35.0	34.8	22.0	13.2	8.4

Identified seaborne exports of North Vietnamese pig iron in 1965 increased nearly 9 percent over the 1964 volume to 47,500 tons. Free World countries again took the entire amount, the major share (37,200 tons) going to Japan. Although 58 percent of the pig iron shipments were made in the first three months of 1965, no apparent connection exists between their subsequent decline and the stepped up bombing of selected transportation routes in North Vietnam. The rail line connecting the blast furnaces at Thai Nguyen with Haiphong apparently was not closed to through traffic for any significant length

~~SECRET~~

~~SECRET~~

of time. A decline in demand is a more likely explanation for the low volume of pig iron exports over the last nine months shown below (in thousand metric tons):

Quarter			
First	Second	Third	Fourth
27.6	5.1	9.6	5.2

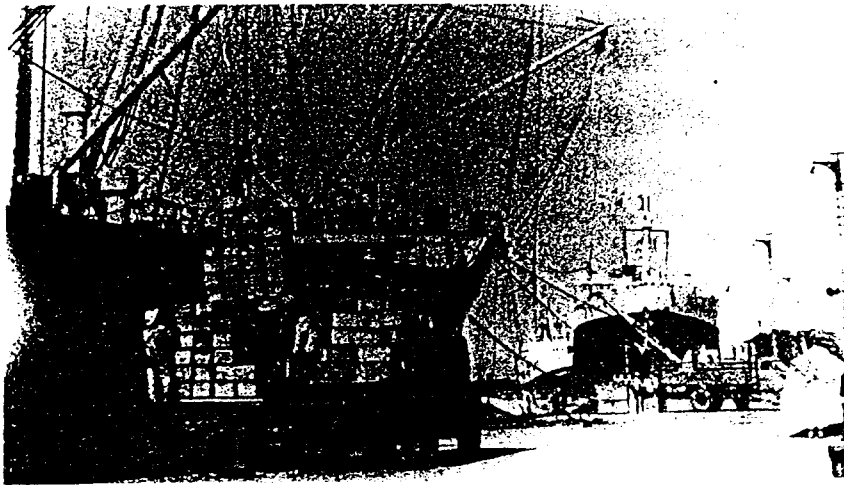
The volume of all other identified seaborne exports from North Vietnam in 1965 amounted to 119,500 tons, compared with 93,000 tons the year before. These exports consisted largely of fresh fruit, preserved foodstuffs, textiles, and handicraft items of reed and bamboo. Shipments to Communist countries increased from 66,900 tons in 1964 to 72,100 tons in 1965. Shipments to Free World countries, on the other hand, nearly doubled, reaching a total of 47,400 in 1965. The USSR, with a volume of 42,800 tons, was the principal recipient of miscellaneous cargoes not included among the major categories of North Vietnam's seaborne exports.

C. CARGOES HANDLED BY NORTH VIETNAMESE INTERNATIONAL MARITIME PORTS

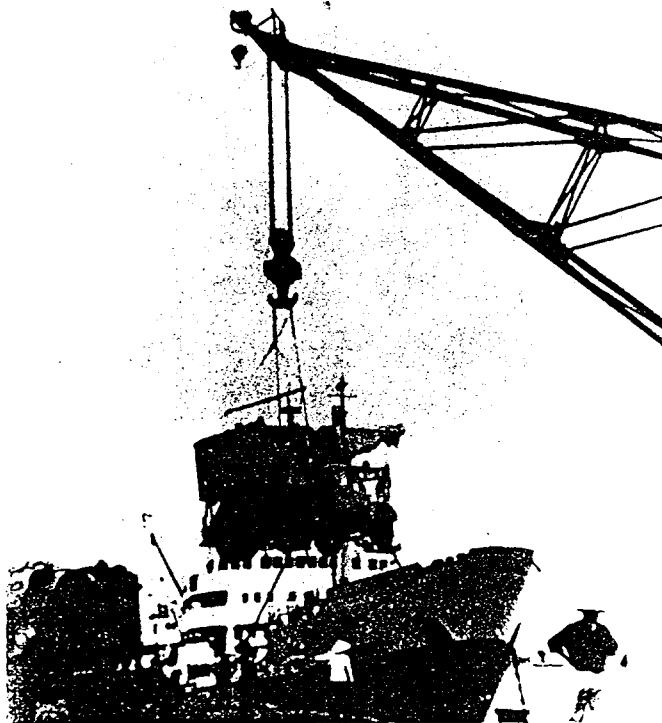
Deep-draft international maritime ships normally call at only three North Vietnamese ports—Haiphong, Cam Pha, and Hon Gay (see Figures 4 and 5). Of the three, only Haiphong provides ready access to North Vietnam's rail network. It is the principal maritime port for all international cargoes except coal. In 1965, Haiphong handled more than half of North Vietnam's international seaborne trade, including almost all seaborne imports.

The volume of identified seaborne cargoes moved through Haiphong in 1965 was slightly larger than that for 1964, but the actual volume probably was substantially larger because of the increase in Chinese Communist shipping, for which there is only fragmentary cargo information. Available data indicate that the volume of export cargoes shipped from Haiphong declined sharply between the first and fourth quarters of the year, while the volume of import cargoes increased irregularly and to a lesser degree, as shown in Table 11.

Cam Pha and Hon Gay handle only one significant cargo (anthracite), moving in only one direction (outbound). Both ports have limited wharf and storage facilities for general cargoes, which consist almost exclusively of supplies required by the mines and their small worker communities. The combined volume of shipments from

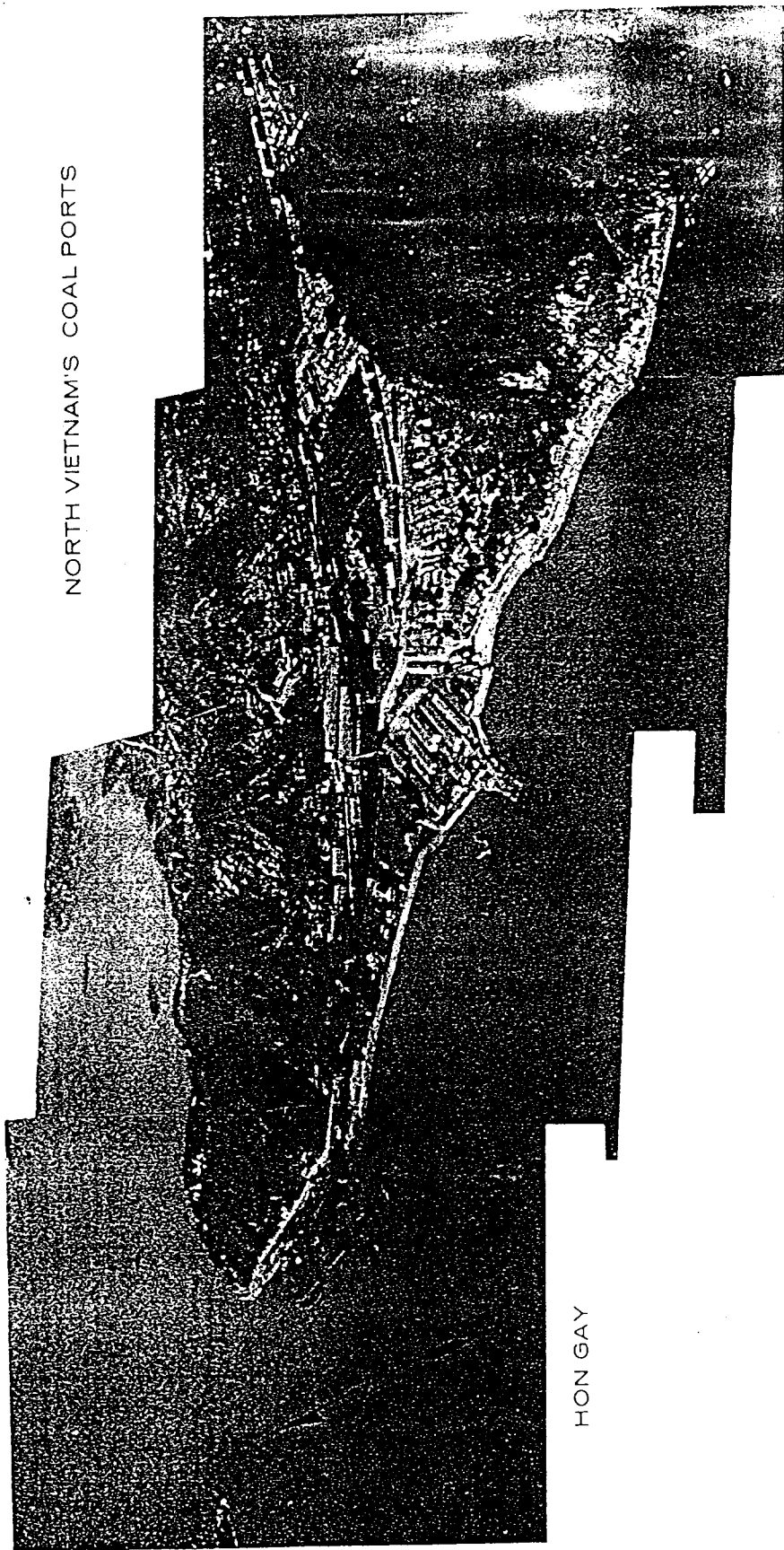


CARGO-HANDLING
OPERATIONS AT
HAIPHONG



~~CONFIDENTIAL~~

NORTH VIETNAM'S COAL PORTS



HON GAY



CAM PHA

~~SECRET~~

these coal ports increased 21 percent in 1965, compared with 1964; and 90 percent of the total was shipped from Cam Pha, as shown in Table 12.

Table 11

Average Monthly Volume of Foreign Ship Cargoes Handled by Haiphong
1964, 1965, and Quarterly 1965
Thousand Metric Tons

	Average Monthly Volume					
	1964	1965	Quarter, 1965			
			First	Second	Third	Fourth
Total.....	104.4	105.0	138.1	105.5	82.4	94.0
Imports.....	53.2	58.1	50.4	55.7	48.5	77.7
Exports.....	51.2	46.9	87.7	49.8	33.9	16.3

Table 12

Average Monthly Volume of Coal Shipments from North Vietnam Carried on Foreign Ships •
1964 and 1965
Thousand Metric Tons

	Average Monthly Volume					
	1964	1965	Quarter, 1965			
			First	Second	Third	Fourth
Total.....	79.2	95.8	80.3	92.8	93.5	116.7
From Cam Pha.....	NA	86.1	73.2	90.0	84.0	97.3
From Hon Gay.....	NA	9.7	7.2	2.8	9.5	19.3

• Because of rounding, components may not add to totals shown.

~~SECRET~~

BLANK PAGE

~~SECRET~~

APPENDIX A

INTERNATIONAL OPERATIONS BY NORTH VIETNAMESE MERCHANT SHIPS, 1965

Five North Vietnamese ships of over 600 GRT each were engaged in international trade at the end of 1965 (see Table 13). Cargoes identified aboard these ships in 1965 totaled 56,200 tons, an amount equal to about 2 percent of the total of cargoes carried to and from North Vietnam by foreign-flag ships. The aggregate tonnage of North Vietnamese ships making international voyages was more than doubled by the acquisition in October 1965 of a 3,818-GRT dry cargo ship from Poland, but this ship was wrecked five months later.

In 1965 these ships operated exclusively on voyages to Hong Kong or to Huang-pu in Communist China (see Table 14). Of 62 international voyages detected, 46 were made to Hong Kong and 16 were made to Huang-pu. With only rare exceptions, the North Vietnamese ships visited only one of these ports on a given voyage. The distribution of identified cargoes carried on the Hong Kong and Huang-pu runs was 90 percent and 10 percent, respectively. However, because information on Hong Kong cargoes is known to be more complete, the actual distribution of cargoes may have corresponded to the distribution of shipping capacity, which was in the order of 75 percent to Hong Kong and 25 percent on the Huang-pu run.

North Vietnamese merchant ships were most heavily employed in carrying North Vietnamese exports to Hong Kong. Of the 56,200

Table 13

North Vietnamese Ships of over 600 Gross Register Tons
Engaged in International Trade as of 31 December 1965

Ship	Gross Register Tons
Ben Thuy	1,662
Hoa Binh	610
Huu Nghi	909
Thong Nhat	617
Vietba *	3,818
Total	7,616

* Previously the *Gdynia*. It sank on 26 March 1966.

~~SECRET~~

~~SECRET~~

tons of cargo identified aboard these ships in 1965, 91 percent consisted of exports, and 96 percent of these exports went to Hong Kong. The greater share of import cargoes was picked up in Huang-pu. The estimated commodity distribution of these cargoes is shown in Table 15.

Table 14

Distribution of Voyages, Gross Tonnage, and Identified Trade of North Vietnamese Ships,
by Destination *
1965

Destination	Voyages		Tonnage of Ships		Volume of Cargoes	
	Number	Percent	Thousand Gross Register Tons	Percent	Thousand Metric Tons	Percent
Total	62	100	71.1	100	56.2	100
Hong Kong	46	74	53.3	75	50.7	90
Huang-pu	16	26	17.9	25	5.6	10

* Because of rounding, components may not add to totals shown.

Table 15

Identified Trade of North Vietnamese Ships, by Commodity *
1965

		Thousand Metric Tons	
Imports		Exports	
Total	5.0	Total	51.2
Bulk Foods	2.8	Cement	28.3
Miscellaneous	2.2	Coal	4.8
		Apatite	0.7
		Pig iron	0.4
		Rice	0.2
		Miscellaneous	16.8

* Total tonnages are for identified cargoes. To some extent, the distribution of totals, by commodity, are estimates.

~~SECRET~~

APPENDIX B

STATISTICAL TABLES

Table 16

Foreign Ship Arrivals at North Vietnam •
1964 and 1965

Flag	1964		1965	
	Arrivals	Percent	Arrivals	Percent
Total	580	100.0	530	100.0
<i>Free World</i>	<i>402</i>	<i>69.3</i>	<i>256</i>	<i>48.3</i>
Cypriot.....			3	0.6
Danish.....	1	0.2		
Finnish.....	1	0.2		
French.....	1	0.2	2	0.4
Greek.....	35	6.0	28	5.3
Indonesian.....	1	0.2		
Italian.....	11	1.9	1	0.2
Japanese.....	74	12.8	37	7.0
Lebanese.....	20	3.4	9	1.7
Liberian.....	7	1.2	3	0.6
Maltese.....			2	0.4
Netherlands.....	8	1.4	5	0.9
Norwegian.....	43	7.4	29	5.5
Panamanian.....	12	2.1	1	0.2
Swedish.....	3	0.5		
UK.....	177	30.5	136	25.7
West German.....	8	1.4		
<i>Communist</i>	<i>178</i>	<i>30.7</i>	<i>274</i>	<i>51.7</i>
Soviet.....	48	8.3	79	14.9
Eastern European.....	58	10.0	50	9.4
Albanian.....			1	0.2
Bulgarian.....	2	0.3	5	0.9
Czechoslovak.....	7	1.2	4	0.8
East German.....	1	0.2		
Polish.....	48	8.3	40	7.5
Chinese Communist.....	72	12.4	144	27.2
Cuban.....			1	0.2

• Because of rounding, components may not add to totals shown.

~~SECRET~~

~~SECRET~~

Table 17

Identified Imports to North Vietnam Carried on Foreign Ships, by Commodity and Origin *
1964 and 1965

Thousand Metric Tons

Commodity	Origin					
	1964			1965		
	Free World	Communist Countries	Total	Free World	Communist Countries	Total
Grain and other bulk food-stuffs.....	102.3	59.7	162.0	59.6	59.0	118.6
Ammonium sulfate and other fertilizer.....	37.3	102.5	139.8	44.2	118.2	162.4
Petroleum.....		142.0	142.0		170.2	170.2
Timber.....	14.7	17.0	31.7	14.5		14.5
Miscellaneous.....	20.6	141.9	162.5	29.7	201.7	231.4
<i>Total.....</i>	<i>174.9</i>	<i>463.1</i>	<i>638.0</i>	<i>148.0</i>	<i>549.1</i>	<i>697.1</i>

* An additional unknown quantity of imports was carried from Communist China in Chinese Communist ships.

Table 18

Identified Exports from North Vietnam Carried on Foreign Ships, by Commodity
and Destination *
1964 and 1965

Thousand Metric Tons

Commodity	Destination					
	1964			1965		
	Free World	Communist Countries	Total	Free World	Communist Countries	Total
Apatite.....	13.7	324.5	338.2		317.5	317.5
Cement.....	140.1		140.1	67.9	10.5	78.4
Coal.....	690.5	259.5	950.0	538.6	611.6	1,150.1
Pig iron.....	43.6		43.6	47.5		47.5
Miscellaneous.....	26.1	66.9	93.0	47.4	72.1	119.5
<i>Total.....</i>	<i>914.0</i>	<i>650.9</i>	<i>1,564.9</i>	<i>701.4</i>	<i>1,011.7</i>	<i>1,713.1</i>

* Including only partial data for cargoes carried to Communist China in Chinese Communist ships. Because of rounding, components may not add to the totals shown.

~~SECRET~~

~~SECRET~~

~~SECRET~~

Table 21

Identified Imports to North Vietnam Carried on Foreign Ships, by Commodity, Carrier, and Origin *
1965

Thousand Metric Tons														
Commodity and Flag	Total	From Free World Countries							From Communist Countries					
		Hong Kong	Japan	Cambodia	Singapore/ Malaya	West Europe	Other Free World	Total	USSR	Communist China	North Korea	Eastern Europe	Cuba	Total
Total imports.....	697.1	4.3	17.7	29.0	15.3	66.5	15.2	148.0	348.9	97.7	35.8	45.6	21.0	549.1
Free World.....	248.4	4.3	7.0	3.9	12.4	65.1	15.1	107.8	.....	76.3	22.9	20.4	21.0	140.6
Soviet.....	385.2	.....	5.3	21.2	2.4	.....	.....	28.9	348.9	.....	7.5	.....	.....	356.4
Eastern European.....	46.6	.....	5.4	3.9	0.5	1.4	0.1	11.3	.....	4.6	5.4	25.2	.....	35.2
Chinese Communist.....	16.8	.....	.....	.....	.....	.....	.....	.....	.....	16.8	.....	.....	.....	16.8
Grain and other bulk foodstuffs.....	118.6	0.8	.....	14.5	10.0	24.3	10.0	59.6	0.7	17.1	.....	20.4	20.8	69.0
Free World.....	102.3	0.8	.....	.....	10.0	24.3	10.0	45.1	.....	16.0	.....	20.4	20.8	57.2
Soviet.....	11.5	.....	.....	10.8	.....	.....	.....	10.8	0.7	.....	.....	.....	.....	0.7
Eastern European.....	3.7	.....	.....	3.7	.....	.....	.....	3.7	.....	.....	.....	.....	.....	.....
Chinese Communist.....	1.1	.....	.....	.....	.....	.....	.....	.....	.....	1.1	.....	.....	.....	1.1
Ammonium sulfate and other fertilizer.....	162.4	.....	3.4	.....	.....	40.8	.....	44.2	78.5	.....	30.7	9.0	.....	118.2
Free World.....	58.7	.....	.....	.....	.....	40.8	.....	40.8	.....	.....	17.9	.....	.....	17.9
Soviet.....	89.4	.....	3.4	.....	.....	.....	.....	3.4	78.5	.....	7.5	.....	.....	86.0
Eastern European.....	14.3	.....	.....	.....	.....	.....	.....	.....	.....	.....	5.3	9.0	.....	14.3
Petroleum.....	170.2	.....	.....	.....	.....	.....	.....	0	154.8	13.4	.....	2.0	.....	170.2
Free World.....	13.4	.....	.....	.....	.....	.....	.....	.....	.....	13.4	.....	.....	.....	13.4
Soviet.....	154.8	.....	.....	.....	.....	.....	.....	.....	154.8	.....	.....	.....	.....	154.8
Eastern European.....	2.0	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	2.0	.....	2.0
Timber.....	14.5	.....	.....	14.5	.....	Negl.	.....	14.5	.....	.....	.....	.....	.....	0
Free World.....	3.9	.....	.....	3.9	.....	.....	.....	3.9	.....	.....	.....	.....	.....	.....
Soviet.....	10.4	.....	.....	10.4	.....	.....	.....	10.4	.....	.....	.....	.....	.....	.....
Eastern European.....	0.2	.....	.....	0.2	.....	Negl.	.....	0.2	.....	.....	.....	.....	.....	.....
Miscellaneous.....	231.4	3.5	14.3	.....	5.3	1.4	5.2	29.7	114.9	67.3	5.1	14.2	0.2	201.7
Free World.....	70.2	3.5	7.0	.....	2.4	.....	5.1	18.0	.....	46.9	5.0	.....	0.2	52.1
Soviet.....	119.1	.....	1.9	.....	2.4	.....	.....	4.3	114.9	.....	.....	.....	.....	114.9
Eastern European.....	26.4	.....	5.4	.....	0.5	1.4	0.1	7.4	.....	4.6	0.1	14.2	.....	18.9
Chinese Communist.....	15.7	.....	.....	.....	.....	.....	.....	.....	.....	15.7	.....	.....	.....	15.7

* Because of rounding, components may not add to the totals shown.

Identified Imports to North Vietnam Carried on Foreign Ships, by Commodity, Carrier, and Destination *

SECRET

Commodity and Flag	Total	Free World Destinations						Communist Country Destinations						
		Hong Kong	Japan	Cambodia	Singapore/Malaya	West Europe	Other Free World	Total	USSR	Communist China	North Korea	Eastern Europe	Cuba	Total
Total exports.....	1,713.1	32.1	491.2	40.7	38.0	81.2	18.2	701.4	42.8	607.1	58.2	208.4	95.2	1,011.7
Free World.....	1,258.0	18.9	432.4	15.8	6.5	58.1	17.2	548.9	18.4	424.2	26.3	153.4	86.7	709.0
Soviet.....	172.8	2.5	56.9	19.8	28.1	.....	.....	107.3	24.5	.....	31.1	10.0	.....	65.6
Eastern European.....	90.0	7.1	1.7	5.2	3.4	23.1	1.0	41.6	.....	2.6	0.8	45.0	.....	48.4
Chinese Communist.....	183.8	3.6	.....	.....	.....	.....	.....	3.6	.....	180.3	.....	.....	.....	180.3
Cuban.....	8.5	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	8.5	8.5
Apatite.....	317.5	.....	.....	.....	.....	.....	.....	0	.....	89.2	44.8	183.5	.....	317.5
Free World.....	253.0	.....	.....	.....	.....	.....	.....	.....	.....	79.3	20.3	153.4	.....	253.0
Soviet.....	34.5	.....	.....	.....	.....	.....	.....	.....	.....	.....	24.5	10.0	.....	34.5
Eastern European.....	22.5	.....	.....	.....	.....	.....	.....	.....	.....	2.4	.....	20.1	.....	22.5
Chinese Communist.....	7.5	.....	.....	.....	.....	.....	.....	.....	.....	7.5	.....	.....	.....	7.5
Cement.....	78.4	6.6	.....	36.3	15.0	10.0	.....	67.9	.....	10.5	.....	.....	.....	10.5
Free World.....	42.8	6.6	.....	15.2	2.0	10.0	.....	33.8	.....	9.0	.....	.....	.....	9.0
Soviet.....	27.5	.....	.....	16.0	11.6	.....	.....	27.5	.....	.....	.....	.....	.....	.....
Eastern European.....	6.6	.....	.....	5.2	1.4	.....	.....	6.6	.....	.....	.....	.....	.....	.....
Chinese Communist.....	1.5	.....	.....	.....	.....	.....	.....	.....	.....	1.5	.....	.....	.....	1.5
Coal.....	1,150.1	11.4	443.1	.....	16.5	67.5	.....	588.6	.....	495.1	11.8	10.3	94.3	611.6
Free World.....	881.9	11.4	389.9	.....	4.5	48.1	.....	453.9	.....	335.9	6.0	.....	86.0	427.9
Soviet.....	71.0	.....	53.2	.....	12.0	.....	.....	65.2	.....	.....	5.8	.....	.....	5.8
Eastern European.....	29.7	.....	.....	.....	.....	19.4	.....	19.4	.....	.....	.....	10.3	.....	10.3
Chinese Communist.....	159.3	.....	.....	.....	.....	.....	.....	.....	.....	159.3	.....	.....	.....	159.3
Cuban.....	8.3	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	8.3	8.3
Pig iron.....	47.5	.....	37.3	.....	0.2	.....	10.0	47.5	.....	.....	.....	.....	.....	0
Free World.....	47.2	.....	37.2	.....	.....	.....	10.0	47.2	.....	.....	.....	.....	.....	.....
Soviet.....	0.2	.....	.....	.....	0.2	.....	.....	0.2	.....	.....	.....	.....	.....	.....
Eastern European.....	0.1	.....	0.1	.....	.....	.....	.....	0.1	.....	.....	.....	.....	.....	.....
Miscellaneous.....	119.5	14.0	10.7	4.4	6.4	3.7	8.2	47.4	42.8	12.2	1.6	14.6	0.9	72.1
Free World.....	33.0	0.9	5.2	0.6	.....	.....	7.2	14.0	18.4	.....	.....	Negl.	0.7	19.1
Soviet.....	39.7	2.5	3.7	3.8	4.4	.....	.....	14.4	24.5	.....	0.8	.....	.....	25.3
Eastern European.....	31.0	7.1	1.7	.....	2.0	3.7	1.0	15.5	.....	0.2	0.8	14.6	.....	15.6
Chinese Communist.....	15.6	3.6	.....	.....	.....	.....	.....	3.6	.....	12.0	.....	.....	.....	12.0
Cuban.....	0.2	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	0.2	0.2

* Because of rounding, components may not add to the totals shown.

SECRET

Table 23

Foreign Ship Arrivals at North Vietnam
1964, 1965, and Monthly 1965

Flag	Total 1964	Jan- uary	Feb- ruary	March	April	May	June	July	August	Sep- tember	Octo- ber	No- vem- ber	Decem- ber	Arrivals	
														Total 1965	
Total.....	580	60	52	58	34	51	45	41	38	30	35	44	42	530	
Free World.....	402	38	37	34	8	27	24	21	12	11	16	15	13	253	
Cypriot.....									1		1		1	3	
Danish.....	1														
Finnish.....	1														
French.....	1					1						1		2	
Greek.....	35	2	2	2	1	7	4	7				1	2	28	
Indonesian.....	1														
Italian.....	11		1											1	
Japanese.....	74	15	11	11										37	
Lebanese.....	20	2	1	2		1	3							9	
Liberian.....	7			1		1		1						3	
Maltese.....								1	1					2	
Netherlands.....	8			3		1	1							5	
Norwegian.....	43	1	2	4	3	4	3	3	3	3	2	1		29	
Panamanian.....	12			1										1	
Swedish.....	3														
British.....	177	18	20	10	4	12	13	9	7	8	13	12	10	136	
West German.....	8														
Communist.....	178	22	15	24	26	24	21	20	26	19	19	29	29	274	
Soviet.....	48	12	5	4	6	8	6	7	7	3	4	7	10	79	
Eastern European.....	58	4	5	3	7	3	5	4	3	3	4	5	4	50	
Albanian.....									1					1	
Bulgarian.....	2	1			1							2	1	5	
Czechoslovak.....	7		1	1	1		1							4	
East German.....	1														
Polish.....	48	3	4	2	5	3	4	4	2	3	4	3	3	40	
Chinese Communist.....	72	6	5	17	13	13	10	9	16	13	11	16	15	144	
Cuban.....												1		1	

~~SECRET~~~~SECRET~~

SECRET

Table 24
Identified Trade with North Vietnam Carried on Foreign Ships^a
1964 and 1965

Flag	Imports			Exports			Total Seaborne Trade		
	1964		1965	1964		1965	1964		1965
	Volume (Thou- sand Metric Tons)	Per- cent	Volume (Thou- sand Metric Tons)	Volume (Thou- sand Metric Tons)	Per- cent	Volume (Thou- sand Metric Tons)	Volume (Thou- sand Metric Tons)	Per- cent	Volume (Thou- sand Metric Tons)
Total	638.0	100.0	697.1	1,564.9	100.0	1,713.1	2,202.9	100.0	2,410.2
Free World	287.0	45.0	248.4	1,337.9	85.5	1,268.0	1,624.9	73.8	1,506.4
Communist	351.0	55.0	448.7	227.0	14.5	445.1	578.0	26.2	903.8
Soviet	266.0	41.7	385.2	128.6	8.2	172.8	394.6	17.9	558.0
Eastern European	62.0	9.7	46.6	98.4	6.3	90.0	160.4	7.3	136.6
Chinese Communist ^b	23.0	3.6	16.8	2.4	0.1	183.8	23.0	1.0	200.6
Cuban						8.5			8.5
						0.5			0.4

^a Because of rounding, components may not add to totals shown.

^b An additional unknown quantity probably was carried by Chinese Communist ships.

SECRET

~~SECRET~~

~~SECRET~~